

Work Order ID 83281

Monday, April 16, 2012 2:23:44 PM

83281*Ship Wednesday* Page 1

Item ID: DSI 9464-011

Accept

N900040100Setup Start ***NS1***

Revision ID:

Item Name: Skidtube Tuning

Stop ***NS2***

Start Date: 4/16/2012 Start Qty: 1.00

1

Cust Item ID:

Required Date: 4/18/2012 Req'd Qty: 1.00

1

Customer:

Reference:

Approvals: Process Plan: *mf*Date: *12-04-16* Tooling:

Date:

Run Start ***NR1***

QC:

Date:

SPC (Y/N):

Date:

Stop ***NR2***Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID

Tool #

Plan
CodeAccept
QtyReject
QtyReject
NumberInsp.
Stamp

Draw Nbr

Revision Nbr

D3955

A

DSI 9464

B

100

0.00

100

DC

Document Control

Memo

Photocopy bluefile & type labels per PPP DSI 9464-011
CHG001

0.00

110

Pick Kit

0.00

110

Packaging

Packaging

Memo

0.00

*ML 12/04/17**12/4/16*

Dart Aerospace Ltd

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____
 Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Work Order ID 83281

Monday, April 16, 2012 2:23:44 PM

83281

Page 2

Item ID: DSI 9464-011

Accept

N900040100Setup Start ***NS1***

Revision ID:

Stop ***NS2***

Item Name: Skidtube Tuning

Start Date: 4/16/2012 Start Qty: 1.00

1

Cust Item ID:

Required Date: 4/18/2012 Req'd Qty: 1.00

1

Customer:

Reference:

Approvals: Process Plan:

Date:

Tooling:

Date:

Run Start ***NR1***

QC:

Date:

SPC (Y/N):

Date:

Stop ***NR2***Sequence ID/
Work Center IDOperation
DescriptionSet Up/
Run Hours

Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
---------	--------	-----------	------------	------------	---------------	-------------

120

QC4- 100% Inspect kits for completeness

0.00

120

QC

Memo

0.00

Quality Control

130

0.00

130

Packaging

Memo

0.00

Packaging

Identify and pack for shipping as per PPP DSI 9464-011

Location: 10PPP rev: A

140

QC21- Final Inspection - Work Order Release

0.00

140

QC

Memo

0.00

Quality Control

MLJ 12/04/18

UNF
12-04-18

Dart Aerospace Ltd

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

Monday, April 16, 2012 2:23:42 PM

Page 1

Work Order ID: 83281

Parent Item: DSI 9464-011

Parent Item Name: Skidtube Tuning

Start Date: 4/16/2012

Required Date: 4/18/2012

Start Qty: 1.00

Required Qty: 1.00

Comments: IPP RevA: New issue DD verified by:EC
10.04.19 verified by:EC

IPP Rev:B as per ECN10-553 DD

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
D3955-041 Doubler Assembly		Manufactured	No			110	Each	2.0000	2	2		SP	
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST075		2							
				80620		2							
D3955-3 Cover Plate		Manufactured	No			110	Each	2.0000	2	2			
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST097		2							
				80621		2							
D3955-5 Plate		Manufactured	No			110	Each	9.0000	2	2			
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST077		9							
				82617		9							
D3955-7 Plate		Manufactured	No			110	Each	1.0000	6	6			
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST071		1							
				80622		1							
D3955-21 Gasket		Manufactured	No			110	Each	8.0000	2	2			
				<u>Location</u>		<u>Loc Qty</u>		<u>Loc Code</u>					
				ST075		8							
				67410		2							
				80623		6							
D3955-23 Template		Manufactured	No			110	Each	0.0000	2	2			

83290

12/4/12 SP

383306 SP
12-04-18

Dart Aerospace Ltd

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

Monday, April 16, 2012 2:23:43 PM

Page 2

Work Order ID: 83281

Parent Item: DSI 9464-011

Parent Item Name: Skidtube Tuning

Start Date: 4/16/2012

Required Date: 4/18/2012

Start Qty: 1.00

Required Qty: 1.00

CR3212-4-04

Cherry Rivet

Purchased

No

110

Each

5,255.0000

38

38

Location

Loc Qty

Loc Code

ST331

154

116471

74

117816

3

118686

1

118840

16

119017

60

st510

5101

119075

5101

AN3-5A

Bolt

Purchased

No

110

Each

1,508.0000

4

4

Location

Loc Qty

Loc Code

ST350

1508

115371

46

117423

124

118626

145

119355

200

120187

500

121185

493

AN3-6A

Bolt

Purchased

No

110

Each

322.0000

4

4

Location

Loc Qty

Loc Code

ST351

322

117441

36

120498

36

120644

100

121060

50

121166

100

Monday, April 16, 2012 2:23:43 PM

Shop Packet Print

Page 2

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

Monday, April 16, 2012 2:23:43 PM

Page 3

Work Order ID: 83281

Parent Item: DSI 9464-011

Parent Item Name: Skidtube Tuning

Start Date: 4/16/2012

Required Date: 4/18/2012

Start Qty: 1.00

Required Qty: 1.00

AN3-7A Bolt	Purchased	No	110	Each	91.0000	4	4		
			<u>Location</u>		<u>Loc Qty</u>	<u>Loc Code</u>			
			ST351		91				
			117872		91				
AN3-10A Bolt	Purchased	No	110	Each	298.0000	4	4		
			<u>Location</u>		<u>Loc Qty</u>	<u>Loc Code</u>			
			GA		18				
			119084		18				
			ST351		280				
			117795		2				
			120873		278				
NAS1149D0332J Washer	Purchased	No	110	Each	2,965.0000	6	6		
			<u>Location</u>		<u>Loc Qty</u>	<u>Loc Code</u>			
			ST298		2965				
			105793		12				
			110985		4				
			117087		89				
			119042		38				
			119717		554				
			120644		277				
			121011		1991				

Monday, April 16, 2012 2:23:44 PM

Shop Packet Print

Page 3

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Picklist Print

Monday, April 16, 2012 2:23:44 PM

Page 4

Work Order ID: 83281

Parent Item: DSI 9464-011

Parent Item Name: Skidtube Tuning

Start Date: 4/16/2012

Required Date: 4/18/2012

Start Qty: 1.00

Required Qty: 1.00

MS21042L3

Nut

Purchased

No

110

Each

2,905.0000

2

2

12/4/17

Location

Loc Qty

Loc Code

ST300

2905

117441

16

117885

32

118451

5

118927

3

119017

1691

119075

158

121349

1000

2

Monday, April 16, 2012 2:23:44 PM

Shop Packet Print

Page 4

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

REFERENCE ONLY

DART SERVICE INSTRUCTION

TO AMEND:

INSTALLATION INSTRUCTIONS D205-634 REV. F OR EARLIER,
INSTALLATION INSTRUCTIONS D204-635 REV. F OR EARLIER,
INSTRUCTIONS FOR CONTINUED AIRWORTHINESS ICA-D205-634 REV. 3 OR EARLIER,
AND INSTRUCTIONS FOR CONTINUED AIRWORTHINESS ICA-D204-635 REV. 3 OR EARLIER

REF CANADIAN STC: SH96-88
REF FAA STC: SR00563NY
REF EASA STC: EASA.IM.R.S.01303

Purpose:

The Purpose of the DSI 9464-011 Kit is to allow operators to tune landing gear utilizing D205-634-041 / D204-635-041 skidtube in order to eliminate vibration. This kit consists of various weights that can be attached to the fwd cap of the Dart skidtube.

Procedure:

Note: Installer must be careful not to damage underlying skidtube during drilling operations.

- 1) Locate D3955-23 template on the fwd cap of the skidtube. Transfer drill 19 x Ø0.098" holes from the D3955-23 template to the skidtube cap using a #30 drill.
- 2) Transfer drill 1 x Ø0.625" (15.8 mm) from the D3955-23 template to the skidtube as shown in Figure 1.
- 3) Transfer drill 1 x Ø0.201" (#7 drill) from the D3955-23 template to the skidtube as shown in Figure 1.
- 4) Deburr the drilled holes in fwd cap. Ensure the top surface of the cap is clear of debris.
- 5) Apply a layer of Sikaflex-241/-291 or Proseal 890 or MIL-S-8802 Class B2 sealant between the D3955-041 Doubler and the existing skidtube cap. Install D3955-041 Doubler Assy. using 19 x CR3212-4-04 rivets as shown in Figure 1. The nutplate in the D3955-041 Doubler Assy should pass thru the Ø0.625 hole in the cap.
- 6) Install tuning plates as shown in Figure 2. Torque AN3 bolts 15-25 in-lb (1.7-2.8 N-m). Test the landing gear for vibration.
- 7) If vibration persists, repeat step 6 until vibration is eliminated.
- 8) Update Weight & Balance as outlined below.

Weight And Balance:






The weight and balance increase associated with the installation of the DSI 9464-011 kit will depend on the number of plates that are installed to tune the gear. The weight of individual plates are given in the Parts List Table. The longitudinal arm for the installation of the DSI 9464-011 kit is 40.0 in (1.02 m) on 205/210/212/214/412 models and 42.0 in (1.07 m) on 204 models.

CANADA
DEPARTMENT OF TRANSPORT
AIRCRAFT CERTIFICATION
BRANCH
DAO # 01-O-01

APPROVED

BY: 
D. SHEPHERD (DE # 02)

DATE: 10.04.14
CERT. NO.: SH96-88
ISSUE NO.: 3

B	ADD REF TO D204-635	CP	10.04.14
A	NEW ISSUE	RF	09.07.21
REV.	DESCRIPTION	BY	DATE
DESIGN	RF	DART AEROSPACE LTD	
DRAWN		HAWKESBURY, ONTARIO, CANADA	
CHECKED		DRAWING NO.	REV. B
MFG. APPR.		DSI 9464	SHEET 1 OF 3
APPROVED		TITLE	SCALE
DE APPR.		SKIDTUBE TUNING KIT	NTS
DATE	10.04.14	COPYRIGHT © 2009 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.	

REFERENCE ONLY

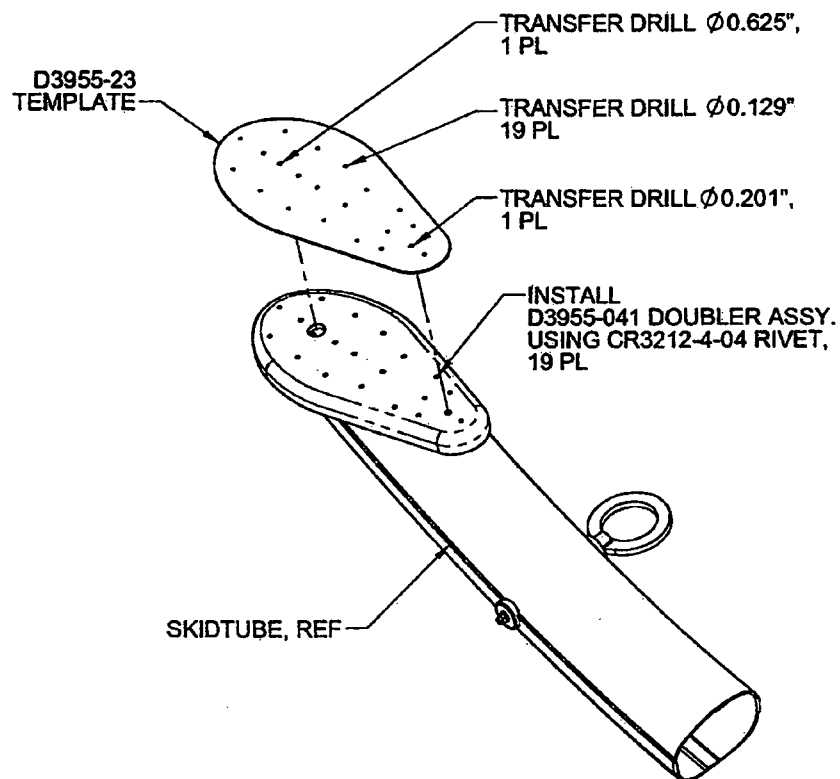





Figure 1

CANADA
DEPARTMENT OF TRANSPORT
AIRCRAFT CERTIFICATION
BRANCH
DAO # 01-O-01

APPROVED
BY: *[Signature]*
D. SHEPHERD (DE # 02)

DATE: 10.04.14
CERT. NO.: SH96-88
ISSUE NO.: 3

DESIGN	RF	DART AEROSPACE LTD	
DRAWN		HAWKESBURY, ONTARIO, CANADA	
CHECKED		DRAWING NO.	REV. B
MFG. APPR.	N/A	DSI 9464	SHEET 2 OF 3
APPROVED		TITLE	SCALE
DE APPR.		SKIDTUBE TUNING KIT	NTS
DATE	10.04.14	COPYRIGHT © 2009 BY DART AEROSPACE LTD	
THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.			

REFERENCE

Part List

Qty -011	Part Number	Description	Weight
X	DSI 9464-011	SKIDTUBE TUNING KIT	N/A
2	D3955-041	DOUBLER ASSEMBLY	0.25 lb/ 0.11 kg
2	D3955-3	COVER PLATE	0.64 lb/ 0.29 kg
2	D3955-5	0.063" THICK PLATE	0.64 lb/ 0.29 kg
6	D3955-7	0.125" THICK PLATE	1.28 lb/ 0.58 kg
2	D3955-21	GASKET	0.08 lb/ 0.04 kg
2	D3955-23	TEMPLATE	N/A
38	CR3212-4-04	RIVET	N/A
4	AN3-5A	BOLT	N/A
4	AN3-6A	BOLT	N/A
4	AN3-7A	BOLT	N/A
4	AN3-10A	BOLT	N/A
6	NAS1149D0332J	WASHER	N/A
2	MS21042L3	NUT (OR MS21042-3)	N/A

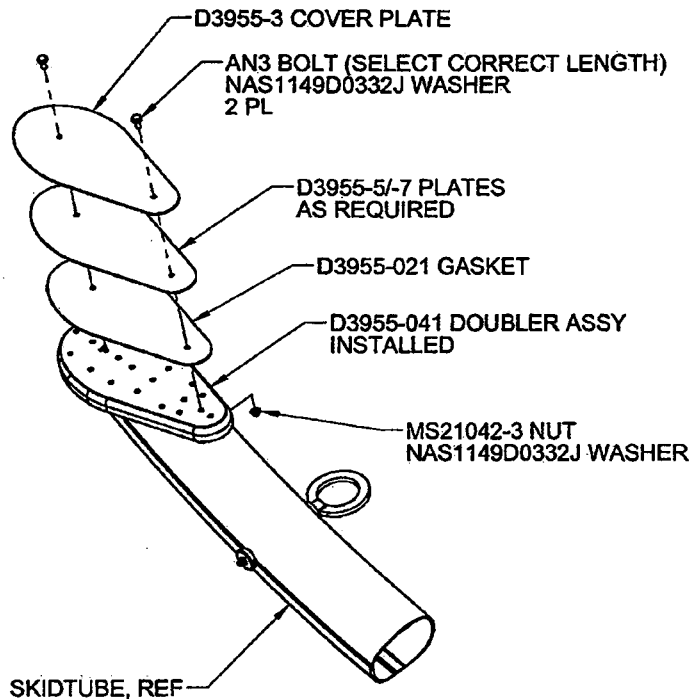


Figure 2

CANADA
DEPARTMENT OF TRANSPORT
AIRCRAFT CERTIFICATION
BRANCH
DAO # 01-O-01

APPROVED
BY: *[Signature]*
D. SHEPHERD (DE # 02)

DATE: 10.04.14
CERT. NO.: SH96-88
ISSUE NO.: 3

DESIGN	RF	DART AEROSPACE LTD	
DRAWN	<i>[Signature]</i>	HAWKESBURY, ONTARIO, CANADA	
CHECKED		DRAWING NO.	REV. B
MFG. APPR.	<i>[Signature]</i>	DSI 9464	SHEET 3 OF 3
APPROVED	<i>[Signature]</i>	TITLE	SCALE
DE APPR.	<i>[Signature]</i>	SKIDTUBE TUNING KIT	NTS
DATE	10.04.14	<small>COPYRIGHT © 2009 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.</small>	